

PIAS2 Antibody (internal region)
Peptide-affinity purified goat antibody
Catalog # AF2506a**Specification**

PIAS2 Antibody (internal region) - Product Information

Application	IHC, E
Primary Accession	O75928
Other Accession	NP_775298.1 , NP_004662.2 , 9063 , 17344 (mouse)
Reactivity	Human
Predicted	Mouse, Rat, Dog
Host	Goat
Clonality	Polyclonal
Concentration	0.5 mg/ml
Isotype	IgG
Calculated MW	68240

PIAS2 Antibody (internal region) - Additional Information**Gene ID** 9063**Other Names**

E3 SUMO-protein ligase PIAS2, 6.3.2.-, Androgen receptor-interacting protein 3, ARIP3, DAB2-interacting protein, DIP, Msx-interacting zinc finger protein, Miz1, PIAS-NY protein, Protein inhibitor of activated STAT x, Protein inhibitor of activated STAT2, PIAS2, PIASX

Dilution

IHC~~1:100~500

E~~N/A

Format

0.5 mg/ml in Tris saline, 0.02% sodium azide, pH7.3 with 0.5% bovine serum albumin

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

PIAS2 Antibody (internal region) is for research use only and not for use in diagnostic or therapeutic procedures.

PIAS2 Antibody (internal region) - Protein Information**Name** PIAS2**Synonyms** PIASX

Function

Functions as an E3-type small ubiquitin-like modifier (SUMO) ligase, stabilizing the interaction between UBE2I and the substrate, and as a SUMO-tethering factor. Plays a crucial role as a transcriptional coregulator in various cellular pathways, including the STAT pathway, the p53 pathway and the steroid hormone signaling pathway. The effects of this transcriptional coregulation, transactivation or silencing may vary depending upon the biological context and the PIAS2 isoform studied. However, it seems to be mostly involved in gene silencing. Binds to sumoylated ELK1 and enhances its transcriptional activity by preventing recruitment of HDAC2 by ELK1, thus reversing SUMO-mediated repression of ELK1 transactivation activity. Isoform PIAS2-beta, but not isoform PIAS2-alpha, promotes MDM2 sumoylation. Isoform PIAS2-alpha promotes PARK7 sumoylation. Isoform PIAS2-beta promotes NCOA2 sumoylation more efficiently than isoform PIAS2-alpha. Isoform PIAS2-alpha sumoylates PML at 'Lys-65' and 'Lys-160'.

Cellular Location

Nucleus speckle {ECO:0000250|UniProtKB:Q8C5D8}. Nucleus, PML body. Nucleus.
Note=Colocalizes at least partially with promyelocytic leukemia nuclear bodies (PML NBs) (PubMed:22406621) Colocalizes with SUMO1 in nuclear granules (By similarity) {ECO:0000250|UniProtKB:Q8C5D8, ECO:0000269|PubMed:22406621}

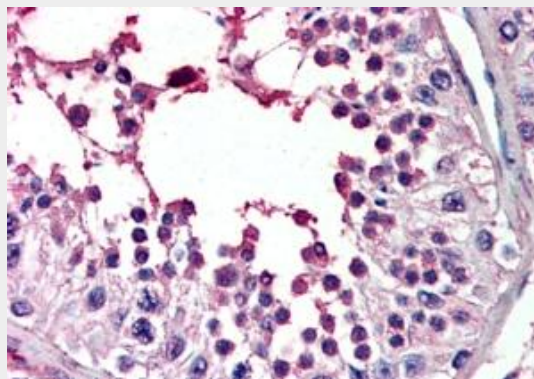
Tissue Location

Mainly expressed in testis. Isoform 3 is expressed predominantly in adult testis, weakly in pancreas, embryonic testis and sperm, and at very low levels in other organs

PIAS2 Antibody (internal region) - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

PIAS2 Antibody (internal region) - Images

AF2506a (3.8 µg/ml) staining of paraffin embedded Human Testis. Steamed antigen retrieval with citrate buffer pH 6, AP-staining.

PIAS2 Antibody (internal region) - Background

This antibody is expected to recognise both reported isoforms (NP_775298.1 and NP_004662.2). No cross-reactivity expected with PIAS1, 3 and 4.

PIAS2 Antibody (internal region) - References

FLI-1 functionally interacts with PIASxalpha, a member of the PIAS E3 SUMO ligase family. van den Akker E, Ano S, Shih HM, Wang LC, Pironin M, Palvimo JJ, Kotaja N, Kirsh O, Dejean A, Ghysdael J. J Biol Chem. 2005 Nov 11;280(45):38035-46. Epub 2005 Sep 7. PMID: 16148010